

PROCEEDINGS
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A NEW RACE OF *PEROGNATHUS LONGIMEMBRIS*
FROM SOUTHERN CALIFORNIA.

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On November 22, 1922, Mr. Luther E. Wyman secured a specimen of *Perognathus longimembris* at Hyperion, Los Angeles County, California. It was preserved as an alcoholic specimen in the Los Angeles Museum and, during the following years, became temporarily forgotten. After the "rediscovery" of *Perognathus pacificus* and the subsequent addition to the knowledge of the extent of its range by the author and others, Mr. George Willett, of the Los Angeles Museum, suggested that the old Wyman specimen be looked up and, if possible, identified. The specimen was found and made into a study skin, but was too discolored from its long immersion in denatured alcohol to be of much use. It was decided, therefore, that an attempt should be made to secure additional specimens. Intermittent trapping at Hyperion and other localities along the coast in Los Angeles County from August to November, 1931, and during April and May, 1932, enabled the writer to secure over a hundred specimens of the pocket mouse in question. Study of these specimens has revealed that they represent an hitherto unrecognized race of *Perognathus longimembris*, which intergrades with *Perognathus pacificus* Mearns, thus reducing the latter to the status of a race of *Perognathus longimembris*. Mr. Seth B. Benson, of the Museum of Vertebrate Zoology, who has also studied the same material, agrees with the writer in this opinion.

I take pleasure in naming this form in honor of Mr. George G. Cantwell who long has aided and encouraged me in my scientific studies.



***Perognathus longimembris cantwelli*, subsp. nov.**

CANTWELL POCKET MOUSE.

Type.—Female adult, skin and skull, no. 1378, collection of Jack C. von Bloeker, Jr., from Hyperion, Los Angeles County, California, collected by Jack C. von Bloeker, Jr., September 5, 1931.

Distribution.—In so far as is known, sand-covered mesas and sandy washes in the vicinity of the sea-coast in Los Angeles County, California.

Diagnosis.—A small, long-tailed, moderately dark-colored pocket mouse of the *longimembris* group with the belly hairs entirely white, or occasionally with plumbeous bases and buffy tips; upper surface of hind feet whitish; lower surface of tail light pinkish cinnamon; skull short and narrow, with slender rostrum and small mastoid bullae.

Comparisons.—Compared with *Perognathus longimembris pacificus*, similar in size of body; tail actually and relatively longer; hind foot larger; color averages lighter dorsally; light pinkish cinnamon colored lateral stripe averages broader. Skull relatively narrower; rostrum more slender; mastoids smaller; angular median projection from posterior margin of frontals not extending as far between the parietals (in most specimens of *pacificus* this projection is strongly developed). Compared with *Perognathus longimembris brevinasus*, body smaller; tail actually and relatively longer; color averages darker dorsally, with more prominent and darker lateral stripe. Skull actually and relatively smaller throughout, with smaller mastoids and more slender rostrum.

Color (using color terms from Ridgway's *Color Standards and Color Nomenclature*, 1912).—*Type*: Dorsal hairs with terminal portions black, subterminal bands light ochraceous buff, brightening to light pinkish cinnamon on the lateral stripes; basal portions of dorsal hairs slate gray. Hairs of breast and upper surface of feet white; hairs of belly slate gray basally and tipped with light pinkish cinnamon. Hairs of tail light pinkish cinnamon except on dorsal surface where black hairs form a narrow stripe, broadest at terminal portion of tail. Hairs at base of vibrissae black.

There is considerable seasonal variation in color, specimens taken in the spring being more reddish and with the dusky less intense. More than half the specimens collected have entirely white belly hairs.

Measurements (in millimeters).—Average of ten sub-adults, eight males and two females, paratypes: Total length, 131.6 (125.0–136.0); tail, 71.7 (65.0–78.0); head and body, 59.9 (58.0–63.0); hind foot, 17.9 (17.0–18.0); ear, from crown, 6.6 (6.0–7.0). Skull: Occipito-nasal length, 19.64 (18.9–20.3); fronto-nasal length, 13.11 (12.7–13.7); greatest mastoid breadth, 10.76 (10.3–11.2); length of mastoid, 7.23 (6.8–7.6); distance between stylomastoid foramina, 9.57 (9.3–9.9); least interorbital breadth, 4.79 (4.5–5.0).

Specimens examined.—Specimens, unless otherwise indicated, are in the writer's collection. Total number examined, two hundred and twenty, all from California, as follows:

Perognathus longimembris cantwelli, 112; LOS ANGELES COUNTY; Palisades del Rey, 3; Hyperion (type locality), 103;¹ Clifton, 3; Wilmington, 3.²

Perognathus longimembris brevinasus, 27; SAN BERNARDINO COUNTY; Cajon Wash (type locality), 10;³ North of Etiwanda, 1;³ Reche Canyon, near Colton, 2;³ LOS ANGELES COUNTY; San Fernando, 5;⁴ RIVERSIDE COUNTY; Reche Canyon, 1;⁵ Vallevista, 8.²

Perognathus longimembris pacificus, 81; ORANGE COUNTY; San Juan Capistrano Point (Dana Point), 10;³ SAN DIEGO COUNTY; San Onofre, 1; two miles east of San Onofre, 1; Santa Margarita River, four miles northwest of Oceanside, 14;⁶ Oceanside, 6;² two miles north of Monument No. 258, United States-Mexico Boundary (type locality), 49.⁷

Remarks.—The race *P. l. cantwelli* occupies the area between the ranges of *P. l. brevinasus* and *P. l. pacificus*. It intergrades with both of these forms, showing that the latter is a race of *P. longimembris*. Specimens from San Fernando, Los Angeles County, here referred to *brevinasus* on the basis of skull characters and size, approach *cantwelli* in color. Similarly, specimens from San Juan Capistrano Point, Orange County, here referred to *pacificus*, approach *cantwelli* in skull characters but maintain the external characters of *pacificus*.

¹Eleven in Los Angeles Museum.

²Museum of Vertebrate Zoology.

³Los Angeles Museum.

⁴One in Museum of Vertebrate Zoology.

⁵Collection of Frank Stephens.

⁶Eight in Los Angeles Museum.

⁷Five in Museum of Vertebrate Zoology, Seventeen in Los Angeles Museum.